MoST

MoST – Mobilitetslab Stor-Trondheim

PERSEUS PhD project:

«Generation of semantic rich digital twin from 3D Lidar point clouds»
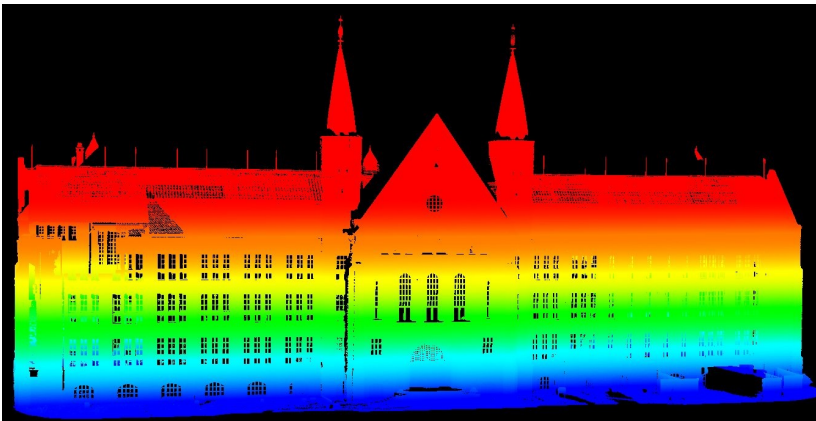
Duration: 2023-2026

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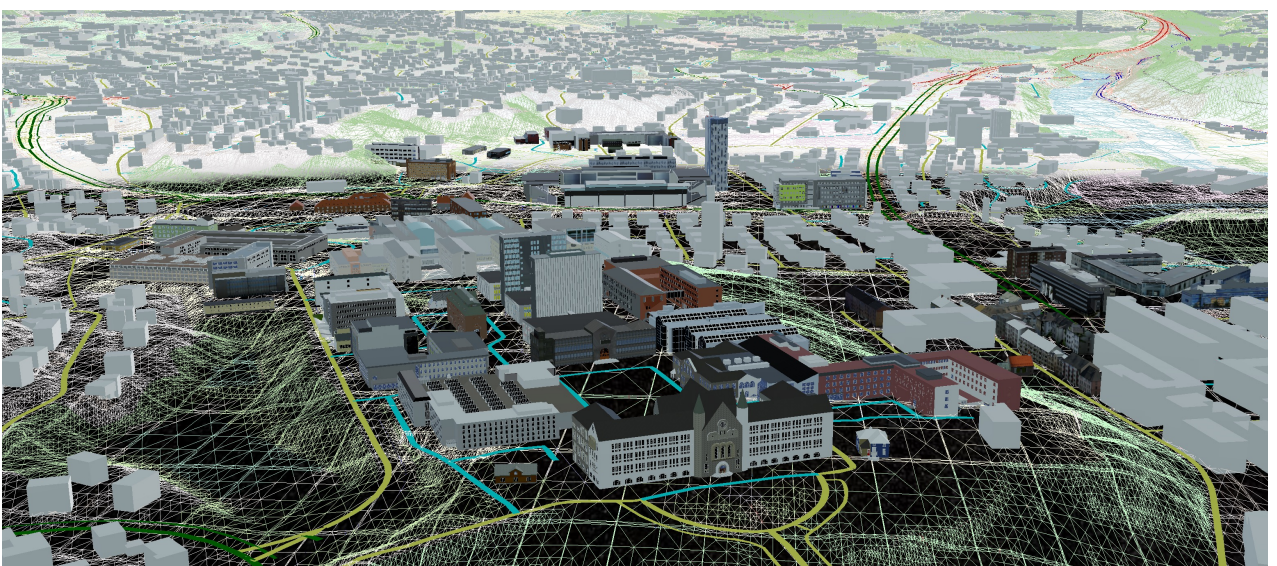**Co-supervisors:**
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In this project, a novel framework will be developed to generate digital twin with geometries, attributes, and semantic information from laser scanning point clouds data. Among others, new deep learning-based algorithms for semantic segmentation and 3D outline extraction will be proposed for traffic related objects (i.e. traffic signs, road marks, urban facilities, etc.) in urban area. This will be integrated together with the existing work for building reconstruction and individual tree detection (ITD) into the framework, so that 3D digital models can be generated with high quality and efficiency.

Digital twins generated with such semantic information and geometries can then be used for interactive simulations, calculations and visualization.

Miljøpakken
– åpner nye muligheter

Trøndelag fylkeskommune
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